

What is claimed is:

1. A computer functioning as a computer-based network switch, comprising:

5 a first network adaptor for connecting to an external network;

a plurality of second network adapters each for forming a connection with a network server;

10 a switching component for receiving network communication data from the external network through the first network adaptor and directing the received network communication data to the second network adapters for transmission to the respective network servers connected thereto; and

15 a test control component for selectively disabling the second network adapters to create connection failure conditions of the connections between the second network adapters and the respective network servers connected thereto.

2. A computer as in claim 1, further including a third network adaptor for connecting the test control component to the external network to allow the test control component to communicate with the external network.

25 3. A computer as in claim 1, wherein the switching component is programmed to operate on network communication data passing therethrough to create a communication test condition other than a connection failure condition.

4. A computer as in claim 3, wherein the switching component is programmed to delay network communication data passing therethrough.

5

5. A computer as in claim 3, wherein the switching component is programmed to selectively drop network communication data.

10 6. A computer as in claim 3, wherein the switching component is programmed to reorder data in a communication stream passing therethrough.

15 7. A computer as in claim 3, wherein the switching component is programmed to introduce errors into network communication data passing therethrough.

20 8. A computer as in claim 1, wherein the switching component is programmed for monitoring flows of network communication data therethrough from the respective network servers to the external network.

25 9. A computer-readable medium having computer-executable components for controlling a plurality of network adapters in a computer to create test conditions for testing network servers connected to the network adapters, comprising:

a switching component for receiving network communication data from an external network and directing the received network communication data to the network adapters for transmission to the respective network servers connected thereto;

a test control for selectively disabling the network servers to create connection failure conditions for connections between the network adapters and the respective network servers connected thereto.

10

10. A computer-readable medium as in claim 9, wherein the switching component includes further computer-executable instructions for operating on network communication data passing therethrough to create a test condition other than a connection failure condition.

11. A computer-readable medium as in claim 10, wherein the switching component includes computer-executable instructions for selectively buffering network communication data passing therethrough for a delay period.

12. A computer-readable medium as in claim 10, wherein the switching component includes computer-executable instructions for selectively dropping network communication data passing therethrough.

13. A computer-readable medium as in claim 10, wherein the switching component includes computer-executable instructions for reordering data in a communication stream passing therethrough.

5

14. A computer-readable medium as in claim 10, wherein the switching component includes computer-executable instructions for introducing errors into network communication data passing therethrough.

10

15. A computer-readable medium as in claim 9, wherein the test control includes computer-executable instructions for communicating with a server testing controller to receive commands regarding testing of the network servers.

15

16. A computer-readable medium as in claim 9, wherein the switching component includes further computer-executable instructions for monitoring flows of network communication data from the respective network servers to the external network.

20

17. A system for testing network servers, comprising:
a computer functioning as a computer-based network switch, including a plurality of network adapters for forming connections to the network servers, a switching component for receiving network communication data from an external network and directing the received network communication data to the

25

network adapters for transmission to the respective network servers connected thereto, and a test control for selectively disabling the network adapters;

5 a plurality of client computers connected to the external network for communication with the network servers through the computer-based network switch;

a server testing controller connected to the external

network for coordinating testing of the network servers,

including instructing the client computers to send network

10 communication data to the network servers through the computer-based network switch, and causing the test control to selectively disable the network adapters to create connection failure conditions of the connections between the network adapters and the network servers connected thereto.

15

18. A system as in claim 17, wherein the switching component is controllable to operate on network communication data passing therethrough to create a test condition other than a connection failure condition.

20

19. A system as in claim 18, wherein the switching component is controllable to selectively buffer network communication data passing therethrough to introduce a delay.

25

20. A system as in claim 18, wherein the switching component is controllable to selectively drop network communication data passing therethrough.

21. A system as in claim 18, wherein the switching component is controllable to reorder network communication data passing therethrough.

5

22. A system as in claim 18, wherein the switching component is controllable to introduce errors in network communication data passing therethrough.

10 23. A system as in claim 17, wherein the switching component is programmed for monitoring flows of network communication data from the network servers to the network clients.

15 24. A method of testing a plurality of network servers, comprising the steps of:

 connecting the network servers to a plurality of network adapters;

20 receiving network communication data from an external network;

 directing the received network communication data to the network adapters for transmission to the respective network servers connected thereto;

25 selectively disabling the network adapters to create connection failure conditions of connections between the network adapters and the network servers connected thereto.

25. A method as in claim 24, further including the step
of operating on the network communication data received from
the external network to create a test condition other than a
connection failure condition before sending the network
5 communication data to the network servers through the network
adapters.

26. A method as in claim 25, wherein the step of
operating includes selectively buffering network communication
10 data passing therethrough for a delay period.

27. A method as in claim 25, wherein the step of
operating includes selectively dropping network communication
data passing therethrough.

15 28. A method as in claim 25, wherein the step of
operating includes reordering network communication data
passing therethrough.

20 29. A method as in claim 25, wherein the step of
operating includes introducing errors to network communication
data passing therethrough.

30. A method as in claim 24, further including the step
25 of monitoring flows of network communication data from the
network servers to the external network.